

Amendment to the Claims

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1 – 26. (Canceled)

27. (Currently amended) A fuel supply assembly comprising:
a vaporization tank to vaporize an amount of fuel;
~~a heating element coupled to the vaporization tank and adapted to vaporize the amount of fuel;~~
an air conduit to supply an amount of air to mix with the vaporized amount of fuel; and
a controller adapted to control a mixture of the vaporized amount of fuel and the amount of air to maintain a desired carbon level present in an amount of combustion exhaust.
28. (Currently amended) The fuel supply assembly of claim 27 ~~wherein the vaporization tank includes a heating element adapted to vaporize the amount of fuel and further comprising a temperature sensor coupled to the vaporization tank and adapted to monitor the temperature of the amount of fuel.~~
29. (Previously presented) The fuel supply assembly of claim 27 further comprising an exhaust sensor adapted to monitor the combustion exhaust for the presence of carbon content.
30. (Previously presented) The fuel supply assembly of claim 29 wherein the exhaust sensor monitors the combustion exhaust for O₂ emissions and determines the presence of carbon content based on the O₂ emissions.
31. (previously presented) The fuel supply assembly of claim 27 further comprising a fuel controller for selectively providing the vaporized amount of fuel and/or liquid fuel to a combustion chamber.

32. (Previously presented) The fuel supply assembly of claim 31 wherein the liquid fuel is a residual fuel, the residual fuel consisting of a portion of the amount of fuel.

33. (Previously presented) The fuel supply assembly of claim 27 further including, a plurality of valves, the plurality of valves controlled by the controller to maintain the mixture of air and the vaporized amount of fuel.

34. (Previously presented) The fuel supply assembly of claim 27 wherein, the air conduit supplies the amount of air into the vaporization tank to mix with the vaporized amount of fuel.

35. (Currently amended) A method comprising:
supplying an amount of fuel into a vaporization tank;
increasing the temperature of the amount of fuel in the vaporization tank to vaporize the amount of fuel;
supplying an amount of air through an air conduit;
mixing the amount of air and the vaporized amount of fuel; and
controlling the mixing of the amount of air and the vaporized amount of fuel to maintain a desired carbon level in an amount of combustion exhaust.

36. (Previously presented) The method of claim 35 further comprising conveying the intermixed amount of air and vaporized amount of fuel to a combustion engine.

37. (Currently amended) The method of claim 35 wherein, the controlling the intermixing of the air and the vaporized amount of fuel to maintain a desired carbon level in ~~an~~ the amount of combustion exhaust includes using a plurality of valves to control the amount of air that is inducted into the vaporization tank.

38. (Previously presented) The method of claim 35 further comprising, continuously monitoring the combustion exhaust for the presence of carbon content.

39. (Previously presented) The method of claim 38 wherein, the monitoring further comprises monitoring O² emissions and determining the presence of carbon content based on the O² emissions.

40. (Previously presented) The method of claim 35 further comprising, purging the vaporization tank periodically.

41. (Previously presented) The method of claim 35 wherein the inducting the amount of air through the air conduit to mix with the vaporized amount of fuel comprises inducting the amount of air through the air conduit and into the vaporization tank to mix with the vaporized amount of fuel.

42. (Previously presented) The method of claim 35 further comprising, increasing the temperature of the vaporized amount of fuel and the amount of air.